

left figures) or losing very few whorls (two right figs.) in the adult stage; widest at the upper third; white. Whorls 25-26, rather strongly convex, the first four smooth, the rest regularly and closely striate, the striae nearly straight, strongly oblique, about as wide as the intervals. Last half whorl free and deeply descending, sharply striate. The free part is cylindrical and forms about one-fifth of the total length of the shell. Aperture circular, oblique, with broadly flaring, trumpet-like peristome. Internal axis very slender and gyrate.

Length 17.3, greatest diameter 1.8 mm.

Length 15, greatest diameter 1.7 mm.

Locality, "La Hembrita," Monte Toro.

This charming species is related to *B. brooksiana*, but differs by the less swollen shape, more numerous whorls and shorter "neck" of the last. Moreover, the last whorl is cylindrical in *U. torreana*, but in *U. brooksiana* it has a conspicuous basal keel. Specimens of *U. brooksiana* are figured, pl. I, fig. 5, for comparison with the new species. By the want of a basal keel and the convex whorls, *B. torreana* is more nearly related to *B. turcasiana*, a far smaller species. Named in honor of my friend Dr. C. de la Torre.

The figured types have been deposited in the collection of the Academy of Natural Sciences.

A NEW CUBAN SPECIES OF BRACHYPODELLA.

BY CARLOS DE LA TORRE.

BRACHYPODELLA (GYRAXIS) RAMSDENI, n. sp. Pl. I, fig. 2.

The shell is very slender, the greatest diameter contained 12 or 13 times in the length, whitish, slightly shining, widest at about the upper fourth, composed of about 25 whorls, adult shells usually having lost a few. The whorls are convex, and the last five or six have a rounded ridge (or basal carina) above the suture, and a slight concavity above the ridge. The last half whorl is free and descends spirally in a long "neck," the basal carina prominent on the upper half of the neck, but gradually disappearing, leaving it nearly cylindrical near the aperture, which is triangular-rounded, oblique, and very small. Sculpture of rather irregular, very oblique striae; the

free part of the last whorl having sharper, more widely-spaced riblets. Internal axis slender, moderately gyrate in the later whorls.

Length 24, greatest diam. 1.8 mm.

Length 22.5, greatest diam. 1.9 mm. (truncate).

Collected at "La Lechuza," Monte Toro, by Mr. Charles T. Ramsden, to whom the species is dedicated.

This is a much larger shell than *B. booksiana* Gundl., with less swollen spire, and much less strongly gyrate axis. The basal carina is visible on more whorls, the neck is shorter, and the sculpture less regular. It is a very interesting addition to the subgenus *Gyraxis*.

REMARKS ON CLASSIFICATION OF THE UNIONIDÆ.

BY L. S. FRIERSON.

In 1820 and in 1831 C. S. Rafinesque published descriptions of a large number of *Unionidæ*. Of these, he is credited in the "Synopsis of the Naiades, C. T. Simpson, 1900," with but seven or eight species. Conrad, having access to specimens labelled by Rafinesque, gave a list of such species as he identified. Except in such cases as when a patent error can be shown we are bound to accept Conrad's identifications.

The fact that Conrad made mistakes at times, can have no weight, for no author is free from these. Conrad, however, only awarded to Rafinesque those species described in 1820. Those described in 1831 have uniformly been dumped by all subsequent authors (known to the writer) in the trash-pile of "indeterminate *Unionidæ*." There is no valid reason for this, as several of these latter species are clearly and unmistakably recognizable. In place of seven or eight species, Rafinesque is entitled to precedence in at least thirty.

An annotated synoptical table is in process of making, and will be published shortly. Because of the important bearing of these facts upon modern classification, this preliminary sketch is given, from the latter point of view, for our author was a genius in the art of proposing *genera*.

(1) LEPTODEA Rafinesque, 1820. Type *leptodon* Rafinesque (= *tenuissimus* Lea). If this species should prove to be congeneric